



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/694,757	10/29/2003	Kyungwoo Kim	117271	5762
25944 7590 01/23/2007 OLIFF & BERRIDGE, PLC P.O. BOX 19928 ALEXANDRIA, VA 22320			EXAMINER BRIGGS, NATHANAEL R	
			ART UNIT	PAPER NUMBER
			2871	
SHORTENED STATUTORY PERIOD OF RESPONSE	MAIL DATE	DELIVERY MODE		
3 MONTHS	01/23/2007	PAPER		

Please find below and/or attached an Office communication concerning this application or proceeding.

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

Office Action Summary

Application No.

10/694,757

Applicant(s)

KIM ET AL.

Examiner

Nathanael R. Briggs

Art Unit

2871

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 29 October 2003.
- 2a) ☐ This action is FINAL. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-6 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-6 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 29 October 2003 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date 4/16/2004.
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____.
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: _____.

DETAILED ACTION

Claim Rejections - 35 USC § 103

1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

2. **Claims 1 and 4-6 are rejected under 35 U.S.C. 103(a) as being unpatentable over Matsufusa (US 6,825,890) in view of Jeong et al. (US 6,765,629).**

3. Regarding claim 1, Matsufusa discloses a touch panel apparatus (see figure 6, for instance) comprising: a liquid crystal display (LCD) device (11) including a liquid crystal (12) section, an illuminating section (column 5, lines 11-16) disposed at a rear side of said liquid crystal (12) section for illuminating said liquid crystal (12) section, and a frame section (15) disposed on an outer periphery of said liquid crystal (12) section; a transparent capacitive membrane type of touch panel (1) disposed at a front side of said LCD device (11); and a spacer member (16) disposed between said frame section (15) of said LCD device (11) and a periphery of said touch panel (1) for defining a clearance between said liquid crystal (12) section of said LCD device (11) and said touch panel (1); wherein said spacer member (16) covers an area from a front surface of said frame section (15) of said LCD device (11) to a periphery of a front surface of said liquid crystal section (12) while maintaining said clearance between said liquid crystal section (12) and said LCD device (11). However, Matsufusa does not expressly disclose wherein the touch panel is a transparent resistive membrane type of touch panel.

Art Unit: 2871

4. Regarding claim 1, Jeong discloses a touch panel apparatus (see figure 3, for instance), wherein the touch panel is a transparent resistive membrane type of touch panel (column 5, lines 1-3).

5. It would have been obvious to one of ordinary skill in the art at the time of the invention to use a resistive type of touch panel like that of Jeong in the LCD of Matsufusa. The motivation for doing so would have been to use a technologically equivalent transparent resistive membrane touch panel technology in place of the transparent capacitive touch panel technology, as taught by Jeong (column 5, lines 5-7). Claim 1 is therefore unpatentable.

6. Regarding claim 4, Matsufusa in view of Jeong discloses the touch panel apparatus according to claim 1 (see figure 6, for instance), and Matsufusa further discloses wherein said spacer member (16) is formed to expose only a display area on a front surface of said liquid crystal section (12) and to cover a periphery of said front surface. Claim 4 is therefore unpatentable.

7. Regarding claim 5, Matsufusa in view of Jeong discloses the touch panel apparatus according to claim 1 (see figure 6, for instance), and Matsufusa further discloses wherein a lower positioning wall projects from a rear surface of said spacer member (16) to engage an outer peripheral side surface of said frame section (15) of said LCD device (11), thereby positioning said frame section (15) with respect to the rear surface of said spacer member (16). Claim 5 is therefore unpatentable.

8. Regarding claim 6, Matsufusa in view of Jeong discloses the touch panel apparatus according to claim 1 (see figure 6, for instance), and Matsufusa further

discloses wherein an upper positioning wall projects from said front surface of said spacer member (16) to engage an outer peripheral side surface of said touch panel (1), thereby positioning said touch panel (1) with respect to the front surface of said spacer member (16). Claim 6 is therefore unpatentable.

9. Claims 2-3 are rejected under 35 U.S.C. 103(a) as being unpatentable over Matsufusa (US 6,825,890) in view of Jeong et al. (US 6,765,629) as applied to claim 1 above, and further in view of Kim (US 7,088,403).

10. Regarding claims 2-3, Matsufusa in view of Jeong discloses the touch panel apparatus according to claim 1 (see figure 6, for instance), and Matsufusa further discloses wherein a portion of said spacer member (16) that covers said liquid crystal section (12) is provided on a rear surface (claim 2) and a front surface (claim 3) for defining a clearance between said spacer member (16) and said liquid crystal section (12, claim 2) and said touch panel (1, claim 3), respectively. However, Matsufusa in view of Jeong does not disclose wherein said spacer member is provided with a recess for defining a clearance between said spacer member and said touch panel or said liquid crystal section, respectively.

11. Regarding claims 2-3, Kim discloses an LCD (see figure 4, for instance), having a spacer (58) wherein a portion of said spacer member (58) is provided in a rear surface (claim 2) and a front surface (claim 3) with a recess for defining a clearance between said spacer member (58) and liquid crystal section (56) or an optical sheet (54e).

12. It would have been obvious to one of ordinary skill in the art at the time of the invention to use the spacer with recesses of Kim in the LCD of Matsufusa in view of

Jeong. The motivation for doing so would have been to fasten the liquid crystal section and the optical sheet in place very securely, as taught by Kim (column 1, lines 56-57).

Claims 2-3 are therefore unpatentable.

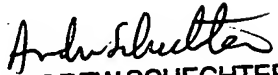
Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Nathanael R. Briggs whose telephone number is (571) 272-8992. The examiner can normally be reached on 9 AM - 5:30 PM Monday through Friday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, David Nelms can be reached on (571) 272-1787. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Nathanael Briggs
1/17/2007


ANDREW SCHECHTER
PRIMARY EXAMINER